```
FILE 'MEDLINE' ENTERED AT 08:01:05 ON 19 NOV 2007
FILE 'CAPLUS' ENTERED AT 08:01:05 ON 19 NOV 2007
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FILE 'BIOSIS' ENTERED AT 08:01:05 ON 19 NOV 2007
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=> s reca (3a) covalent? (3a) (oligonucleotide or probe)
             1 RECA (3A) COVALENT? (3A) (OLIGONUCLEOTIDE OR PROBE)
L1
=> d ti
     ANSWER 1 OF 1 CAPLUS COPYRIGHT 2007 ACS on STN
L1
     Direct probing: covalent attachment of probe DNA to double-stranded target
TI
     DNA
=> d kwic
     ANSWER 1 OF 1 CAPLUS COPYRIGHT 2007 ACS on STN
L1
     Enzymes, biological studies
\operatorname{IT}
     RL: ARU (Analytical role, unclassified); BUU (Biological use,
     unclassified); ANST (Analytical study); BIOL (Biological study); USES
     (Uses)
        (gene ***recA*** ; direct probing by ***covalent***
        of ***probe*** DNA to double-stranded target DNA without target
        dissocn.)
=> s reca (3a) covalent? (3a) (oligonucleotide or probe or ssdna)
             5 RECA (3A) COVALENT? (3A) (OLIGONUCLEOTIDE OR PROBE OR SSDNA)
L2
=> dup remove
ENTER L# LIST OR (END):;2
; 2 IS NOT VALID HERE
The L-number entered has not been defined in this session, or it
has been deleted. To see the L-numbers currently defined in this
session, enter DISPLAY HISTORY at an arrow prompt (=>).
=> dup remove 12
PROCESSING COMPLETED FOR L2
L3 2 DUP REMOVE L2 (3 DUPLICATES REMOVED)
=> d ti 1-2
                                              DUPLICATE 1
     ANSWER 1 OF 2 MEDLINE on STN
L3
     Topological testing of the mechanism of homology search promoted by RecA
TI
     protein.
     ANSWER 2 OF 2 CAPLUS COPYRIGHT 2007 ACS on STN
L3
    Direct probing: covalent attachment of probe DNA to double-stranded target
\mathtt{TI}
     DNA
=> d kwic 1
L3
     ANSWER 1 OF 2 MEDLINE on STN
                                                       DUPLICATE 1
     . . filament and its relaxed or supercoiled circular duplex DNA
AB
     targets. However, the formation of synaptic complexes between an invading
              ***RecA*** - ***ssDNA*** filament and ***covalently***
     closed circular duplex DNAs is promoted by supercoiling of the duplex DNA.
     The results imply that a triplex structure formed. . .
=> s reca (3a) covalent? (3a) (oligonucleotide or probe or ssdna or dna)
             7 RECA (3A) COVALENT? (3A) (OLIGONUCLEOTIDE OR PROBE OR SSDNA OR
L4
               DNA)
=> dup remove 14
PROCESSING COMPLETED FOR L4
L5
              4 DUP REMOVE L4 (3 DUPLICATES REMOVED)
```

- L5 ANSWER 1 OF 4 MEDLINE on STN DUPLICATE 1
- TI Topological testing of the mechanism of homology search promoted by RecA protein.
- L5 ANSWER 2 OF 4 CAPLUS COPYRIGHT 2007 ACS on STN
- TI Direct probing: covalent attachment of probe DNA to double-stranded target DNA
- L5 ANSWER 3 OF 4 CAPLUS COPYRIGHT 2007 ACS on STN
- TI Sequence-Specific Covalent Modification of DNA by Crosslinking Oligonucleotides. Catalysis by RecA and Implication for the Mechanism of Synaptic Joint Formation
- L5 ANSWER 4 OF 4 CAPLUS COPYRIGHT 2007 ACS on STN
- TI Formation of covalently closed heteroduplex DNA by the combined action of gyrase and RecA protein
- => d kwic 15 3
- L5 ANSWER 3 OF 4 CAPLUS COPYRIGHT 2007 ACS on STN
- IT Enzymes

RL: BPR (Biological process); BSU (Biological study, unclassified); BIOL (Biological study); PROC (Process)

(gene \*\*\*recA\*\*\* , sequence-specific \*\*\*covalent\*\*\* modification of \*\*\*DNA\*\*\* by crosslinking oligonucleotides. Catalysis by protein RecA and mechanism of synaptic joint formation)

- => s reca (3a) covalent?
- L6 36 RECA (3A) COVALENT?
- => dup remove 16

PROCESSING COMPLETED FOR L6

L7 13 DUP REMOVE L6 (23 DUPLICATES REMOVED)

- => d ti 1-13
- L7 ANSWER 1 OF 13 MEDLINE on STN DUPLICATE 1
- TI Topological testing of the mechanism of homology search promoted by RecA protein.
- L7 ANSWER 2 OF 13 CAPLUS COPYRIGHT 2007 ACS on STN
- TI Direct probing: covalent attachment of probe DNA to double-stranded target DNA
- L7 ANSWER 3 OF 13 MEDLINE on STN DUPLICATE 2
- TI Inhibition of \*\*\*RecA\*\*\* -mediated cleavage in \*\*\*covalent\*\*\* dimers of UmuD.
- L7 ANSWER 4 OF 13 CAPLUS COPYRIGHT 2007 ACS on STN
- TI Sequence-Specific Covalent Modification of DNA by Crosslinking
  Oligonucleotides. Catalysis by RecA and Implication for the Mechanism of
  Synaptic Joint Formation
- L7 ANSWER 5 OF 13 MEDLINE on STN DUPLICATE 3
- TI The DNA-binding site of the RecA protein. Photochemical cross-linking of Tyr103 to single-stranded DNA.
- L7 ANSWER 6 OF 13 MEDLINE on STN DUPLICATE 4
- TI DNA-binding surface of RecA protein photochemical cross-linking of the first DNA binding site on RecA filament.
- L7 ANSWER 7 OF 13 MEDLINE on STN DUPLICATE 5
- Use of psoralen-modified oligonucleotides to trap three-stranded RecA-DNA complexes and repair of these cross-linked complexes by ABC excinuclease.
- L7 ANSWER 8 OF 13 MEDLINE on STN DUPLICATE 6
- TI Nucleotide binding by a 24-residue peptide from the RecA protein of Escherichia coli.
- L7 ANSWER 9 OF 13 MEDLINE on STN DUPLICATE 7
- TI Tyrosine 264 in the recA protein from Escherichia coli is the site of modification by the photoaffinity label 8-azidoadenosine 5'-triphosphate.

- L7 ANSWER 10 OF 13 MEDLINE on STN DUPLICATE 8
- Affinity labeling of a tyrosine residue in the ATP binding site of the recA protein from Escherichia coli with 5'-p-fluorosulfonylbenzoyladenosin e.
- L7 ANSWER 11 OF 13 MEDLINE on STN DUPLICATE 9

  TI \*\*\*Covalent\*\*\* modification of the \*\*\*recA\*\*\* protein from Escherichia coli with the photoaffinity label 8-azidoadenosine 5'-triphosphate.
- L7 ANSWER 12 OF 13 CAPLUS COPYRIGHT 2007 ACS on STN
- TI Formation of covalently closed heteroduplex DNA by the combined action of gyrase and RecA protein
- L7 ANSWER 13 OF 13 CAPLUS COPYRIGHT 2007 ACS on STN
- TI DNA and nucleoside triphosphate binding properties of recA protein from Escherichia coli
- => d kwic 13
- L7 ANSWER 13 OF 13 CAPLUS COPYRIGHT 2007 ACS on STN
- AB . . . binding is enhanced and stable recA protein.cntdot.DNA.cntdot.ATP .gamma.S complexes are formed. Neither the DNA nor the [.gamma.-thio]triphosphate cofactor appears to be \*\*\*covalently\*\*\* linked to \*\*\*recA\*\*\* protein in these complexes.
- => s (helicase or polymerase or ligase or nuclease or endonuclease) (3a) (covalent? or conjugat?)

  16 (HELICASE OR POLYMERASE OR LIGASE OR NUCLEASE OR ENDONUCLEASE)

  (3A) (COVALENT? OR CONJUGAT?) (3A) (OLIGONUCLEOTIDE OR "PEPTIDE

  NUCLEIC ACID" OR PNA OR DNA OR RNA) (3A) PROBE
- => d ti 1-11
- L9 ANSWER 1 OF 11 CAPLUS COPYRIGHT 2007 ACS on STN
- TI Conjugates of RNA polymerase-binding peptides and FRET-labeled peptide nucleic acid probes for the analysis of nascent transcripts in live cells
- L9 ANSWER 2 OF 11 CAPLUS COPYRIGHT 2007 ACS on STN
- TI A polymerase chain reaction-based ribosomal DNA detection technique using a surface plasmon resonance detector for a red tide causing microalga, Alexandrium affine
- L9 ANSWER 3 OF 11 CAPLUS COPYRIGHT 2007 ACS on STN
- TI Peptide nucleic acid probes targeting rRNA sequence and hybridization assay for wine spoiling Dekkera/Brettanomyces yeast detection
- L9 ANSWER 4 OF 11 CAPLUS COPYRIGHT 2007 ACS on STN
- TI Hybridisation assay involving nuclease-probe conjugates and immobilization of probe or probe-target complexes
- L9 ANSWER 5 OF 11 CAPLUS COPYRIGHT 2007 ACS on STN DUPLICATE 1
- TI Molecular anatomy of \*\*\*RNA\*\*\* \*\*\*polymerase\*\*\* using protein\*\*\*conjugated\*\*\* metal \*\*\*probes\*\*\* with \*\*\*nuclease\*\*\* and
  protease activities
- L9 ANSWER 6 OF 11 CAPLUS COPYRIGHT 2007 ACS on STN
- TI Molecular DNA switches and DNA chips
- L9 ANSWER 7 OF 11 CAPLUS COPYRIGHT 2007 ACS on STN
- TI Direct probing: covalent attachment of probe DNA to double-stranded target DNA
- L9 ANSWER 8 OF 11 CAPLUS COPYRIGHT 2007 ACS on STN
- TI Methods, kit, and adducts for replicative RNA-based amplification detection of target nucleic acid sequences
- L9 ANSWER 9 OF 11 CAPLUS COPYRIGHT 2007 ACS on STN
- TI Use of Altermonas BAL 31 \*\*\*nuclease\*\*\* as \*\*\*probe\*\*\* for 
  \*\*\*covalent\*\*\* alterations in duplex \*\*\*DNA\*\*\*

```
DUPLICATE 2
                       MEDLINE on STN
    ANSWER 10 OF 11
L9
      ***Probes*** of eukaryotic ***DNA*** -dependent RNA
TI
      ***polymerase*** II-II. ***Covalent*** binding of two purine
    nucleoside dialdehydes to the initiation subsite.
                                                     DUPLICATE 3
    ANSWER 11 OF 11
                       MEDLINE on STN
L9
    Conformational transition of Escherichia coli RNA polymerase induced by
TI
     the interaction of sigma subunit with core enzyme.
=> d bib kwic 1, 4
     ANSWER 1 OF 11 CAPLUS COPYRIGHT 2007 ACS on STN
L9
     2006:1225739 CAPLUS <<LOGINID::20071119>>
AN
DN
     146:1566
    Conjugates of RNA polymerase-binding peptides and FRET-labeled peptide
TI
    nucleic acid probes for the analysis of nascent transcripts in live cells
     Eberwine, James H.; Langel, Uelo; Eiriksdottir, Emelia; Peritz, Tiina;
IN
     Sul, Jai-Yoon; Haydon, Philip G.; Kim, Junhyong
     The Trustees of the University of Pennsylvania, USA
PA
     PCT Int. Appl., 174pp.
SO
     CODEN: PIXXD2
DT
     Patent
LA
     English
FAN. CNT 1
                              DATE APPLICATION NO. DATE
                KIND
     PATENT NO.
                        ____
                                          WO 2006-US19107 20060517
                              20061123
     WO 2006125012
                        A2
PI
     WO 2006125012 A3
                              20070503
        W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH,
            CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD,
            GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KM, KN, KP, KR,
            KZ, LC, LK, LR, LS, LT, LU, LV, LY, MA, MD, MG, MK, MN, MW, MX,
            MZ, NA, NG, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE,
            SG, SK, SL, SM, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC,
            VN, YU, ZA, ZM, ZW
        RW: AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE,
            IS, IT, LT, LU, LV, MC, NL, PL, PT, RO, SE, SI, SK, TR, BF, BJ,
            CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG, BW, GH,
            GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY,
            KG, KZ, MD, RU, TJ, TM, AP, EA, EP, OA
                      P 20050518
PRAI US 2005-682334P
                                       ***polymerase*** peptide
    mRNA nascent detection ***RNA***
       Peptides, properties
IT
     RL: ARG (Analytical reagent use); PRP (Properties); ANST (Analytical
     study); USES (Uses)
       ( ***RNA***
                        ***polymerase*** -binding,
                                                   ***probe***
         ***conjugates*** ; ***conjugates*** of ***RNA***

***polymerase*** -binding peptides and FRET-labeled PNA probes for
        anal. of nascent transcripts in live cells)
     Peptides, properties
IT
     RL: ARG (Analytical reagent use); PRP (Properties); ANST (Analytical
     study); USES (Uses)
        (conjugates, with ***peptide*** ***nucleic*** ***acid***
         ***polymerase*** -binding peptides and FRET-labeled PNA probes for
        anal. of nascent transcripts in live cells)
    ANSWER 4 OF 11 CAPLUS COPYRIGHT 2007 ACS on STN
L9
    2000:260583 CAPLUS <<LOGINID::20071119>>
AN
DN
     132:304258
    Hybridisation assay involving nuclease-probe conjugates and immobilization
TI
     of probe or probe-target complexes
IN
     Harbron, Stuart
PA
     UK
SO
     PCT Int. Appl., 46 pp.
    CODEN: PIXXD2
DT
    Patent
LA
     English
FAN.CNT 3
                             DATE APPLICATION NO. DATE
     PATENT NO. KIND
                      ---- ------ ------------ ------
    WO 2000022165 A1 20000420 WO 1999-GB3383 19991012
PI
        W: AE, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CR, CU,
            CZ, DE, DK, DM, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL,
            IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA,
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MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI,
            SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM,
            AZ, BY, KG, KZ, MD, RU, TJ, TM
        RW: GH, GM, KE, LS, MW, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE,
            DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF,
            CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG
                              20000420
                                         CA 1999-2356613
                                                               19991012
    CA 2356613
                        A1
                                         AU 1999-62187
                                                               19991012
                              20000501
    AU 9962187
                        A1
                                                              19991012 .
                                       GB 1999-24169
                             20000816
                        Α
    GB 2346694
                              20010124
                        В
    GB 2346694
                              20010808 EP 1999-949210 19991012
                        A1
    EP 1121463
        R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT,
            IE, SI, LT, LV, FI, RO
                                         JP 2000-576055
    JP 2002527078
                              20020827
                                                              19991012
                        {f T}
                                         US 2001-833918
                              20020711
                                                            20010413
    US 2002090617
                        A1
                        A
                              19981012
PRAI GB 1998-22067
                        W
                            19991012
    WO 1999-GB3383
                   A2 19991014
    US 1999-403105
             THERE ARE 9 CITED REFERENCES AVAILABLE FOR THIS RECORD
RE.CNT 9
             ALL CITATIONS AVAILABLE IN THE RE FORMAT
    Antibodies
IT
    RL: ARU (Analytical role, unclassified); ANST (Analytical study)
       (anti-double-stranded ***DNA***; hybridization assay involving
         ***nuclease*** - ***probe*** ***conjugates***
       immobilization of ***probe*** or probe-target complexes)
      ***DNA***
\mathbf{T}\mathbf{T}
    Nucleic acids
        ***RNA***
    RL: ANT (Analyte); ANST (Analytical study)
       (hybridization assay involving ***nuclease*** - ***probe***
         ***conjugates*** and immobilization of ***probe***
       probe-target complexes)
IT
    Antibodies
    RL: ARU (Analytical role, unclassified); ANST (Analytical study)
       (monoclonal, anti-double-stranded ***DNA***; hybridization assay
       involving ***nuclease*** - ***probe*** ***conjugates***
                                                                      and
       immobilization of ***probe*** or probe-target complexes)
```

=>

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$%^STN; HighlightOn= ***; HighlightOff=*** ;
Connecting via Winsock to STN
Welcome to STN International! Enter x:x
LOGINID:ssptasmb1637
PASSWORD:
TERMINAL (ENTER 1, 2, 3, OR ?):2
                     Welcome to STN International
                 Web Page for STN Seminar Schedule - N. America
 NEWS 1
NEWS 2 JUL 02 LMEDLINE coverage updated
NEWS 3 JUL 02 SCISEARCH enhanced with complete author names
NEWS 4 JUL 02 CHEMCATS accession numbers revised
NEWS 5 JUL 02 CA/Caplus enhanced with utility model patents from China
NEWS 6 JUL 16 CAplus enhanced with French and German abstracts
NEWS 7 JUL 18 CA/Caplus patent coverage enhanced
NEWS 8 JUL 26 USPATFULL/USPAT2 enhanced with IPC reclassification
NEWS 9 JUL 30 USGENE now available on STN
NEWS 10 AUG 06 CAS REGISTRY enhanced with new experimental property tags
NEWS 11 AUG 06 FSTA enhanced with new thesaurus edition
                 CA/CAplus enhanced with additional kind codes for granted
NEWS 12
         AUG 13
                 patents
         AUG 20 CA/CAplus enhanced with CAS indexing in pre-1907 records
 NEWS 13
                 Full-text patent databases enhanced with predefined
         AUG 27
 NEWS 14
                 patent family display formats from INPADOCDB
                 USPATOLD now available on STN
         AUG 27
 NEWS 15
NEWS 16 AUG 28 CAS REGISTRY enhanced with additional experimental
                 spectral property data
                 STN AnaVist, Version 2.0, now available with Derwent
          SEP 07
 NEWS 17
                 World Patents Index
         SEP 13 FORIS renamed to SOFIS
 NEWS 18
                 INPADOCDB enhanced with monthly SDI frequency
         SEP 13
 NEWS 19
         SEP 17 CA/CAplus enhanced with printed CA page images from
 NEWS 20
                 1967-1998
                 CAplus coverage extended to include traditional medicine
         SEP 17
 NEWS 21
                 patents
                 EMBASE, EMBAL, and LEMBASE reloaded with enhancements
         SEP 24
 NEWS 22
                 CA/CAplus enhanced with pre-1907 records from Chemisches
NEWS 23
         OCT 02
                 Zentralblatt
                 BEILSTEIN updated with new compounds
NEWS 24
          OCT 19
NEWS 25 NOV 15 Derwent Indian patent publication number format enhanced
NEWS 26 NOV 19 WPIX enhanced with XML display format
 NEWS EXPRESS 19 SEPTEMBER 2007: CURRENT WINDOWS VERSION IS V8.2,
              CURRENT MACINTOSH VERSION IS V6.0c(ENG) AND V6.0Jc(JP),
              AND CURRENT DISCOVER FILE IS DATED 19 SEPTEMBER 2007.
              STN Operating Hours Plus Help Desk Availability
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 NEWS LOGIN
              Welcome Banner and News Items
              For general information regarding STN implementation of IPC 8
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FILE 'HOME' ENTERED AT 09:58:51 ON 19 NOV 2007
=> file medline caplus embase biosis
COST IN U.S. DOLLARS
                                                SINCE FILE
                                                               TOTAL
                                                             SESSION
                                                    ENTRY
                                                     0.21
                                                                0.21
FULL ESTIMATED COST
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FILE 'CAPLUS' ENTERED AT 09:59:10 ON 19 NOV 2007
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PLEASE SEE "HELP USAGETERMS" FOR DETAILS.
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FILE 'EMBASE' ENTERED AT 09:59:10 ON 19 NOV 2007
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FILE 'BIOSIS' ENTERED AT 09:59:10 ON 19 NOV 2007
Copyright (c) 2007 The Thomson Corporation
=> s (fluorescent? (3a) label? (3a) (oligonucleotide or probe))
          5309 (FLUORESCENT? (3A) LABEL? (3A) (OLIGONUCLEOTIDE OR PROBE))
L1
=> s l1 (50a) advantag? (20a) (enzym? (3a) (oligonucleotide or probe))
             0 L1 (50A) ADVANTAG? (20A) (ENZYM? (3A) (OLIGONUCLEOTIDE OR PROBE)
L2
=> s l1 (50a) advantag? and (enzym? (3a) (oligonucleotide or probe))
            0 L1 (50A) ADVANTAG? AND (ENZYM? (3A) (OLIGONUCLEOTIDE OR PROBE))
L3
=> s l1 and (enzym? (5a) (oligonucleotide or probe))
          156 L1 AND (ENZYM? (5A) (OLIGONUCLEOTIDE OR PROBE))
=> s l1 and (enzym? (5a) (oligonucleotide or probe) (5a) (label? or conjugat?))
          129 L1 AND (ENZYM? (5A) (OLIGONUCLEOTIDE OR PROBE) (5A) (LABEL? OR
L5
              CONJUGAT?))
=> s 15 and advantag?
L6
       3 L5 AND ADVANTAG?
=> dup remove 16
PROCESSING COMPLETED FOR L6
             3 DUP REMOVE L6 (0 DUPLICATES REMOVED)
L7
=> d kwic 1-3
     ANSWER 1 OF 3 CAPLUS COPYRIGHT 2007 ACS on STN
L7
     . . . erythrocyte lysing soln., RNA extn. reagents, RT reaction soln.,
AB
     M-MLV reverse transcriptase, RNase inhibitor, PCR reaction soln.
     comprising primers and ***fluorescent*** - ***labeled***
       ***probe*** , Taq ***enzyme*** , std. sample, and ref. sample, wherein
     primers for prostate specific antigen (PSA) with sequences of
     5-cagtctgcggcggtgtt-3' and 5'-gcaagatcacgcttttgttcct-3', the primers.
       fluorescent quant. RT-PCR to detect the mRNA expression of PSA and PSMA
     by Taq-man probe method. The method has the ***advantages***
     sensitivity and specificity; and can avoid the false pos. result happening
     in conventional RT-PCR amplification.
    ANSWER 2 OF 3 CAPLUS COPYRIGHT 2007 ACS on STN
上7
     . . . example, fluorescent signal when the labeling dyes are sepd. from
AB
     one another. Methods for sepg. the dye include cleaving the
                        ***oligonucleotides*** include using ***enzymes***
       ***labeled***
     that have 5'-exonuclease activity. In one embodiment nucleic acid primers
     of the present invention may fluoresce upon hybridization to a. . . the
     present invention have wide applications ranging from general detection of
     a target nucleic acid sequence to clin. diagnostics. Major
       ***advantages*** of the oligonucleotides including nucleic acid probes
     and primers of many embodiments of the present invention are their
     synthetic simplicity,. . .
    Cyanine dyes
{f IT}
         ***Fluorescent*** dves
     PCR (polymerase chain reaction)
        ( ***oligonucleotides*** ***labeled*** with multiple spectrally
        identical or similar fluorophores for use as primers or probes)
       ***Fluorescent*** dyes
IT
                   (xanthene;
                                                              with multiple
       spectrally identical or similar fluorophores for use as primers or
       probes)
L7
    ANSWER 3 OF 3 CAPLUS COPYRIGHT 2007 ACS on STN
     . . or quantitating the target sequence in the sample. Because the
AB
    non-nucleotide probe/target sequence is protected against degrdn., it is
    another ***advantage*** of this invention that the sample can be
     treated with enzymes which degrade sample components, either before or
```

FILE 'MEDLINE' ENTERED AT 09:59:10 ON 19 NOV 2007

```
Chemiluminescent substances
IT
    Chromophores
        ***Fluorescent*** substances
    Spin labels
       identification of nucleic acids electrostatically bound to matrixes)
      ***Enzymes*** , uses
IT
    Haptens
    Radionuclides, uses
    RL: ARG (Analytical reagent use); ANST (Analytical study); USES (Uses)
          identification of nucleic acids electrostatically bound to matrixes)
=> s 115 and (direct? (2a) detect?)
L15 NOT FOUND
The L-number entered could not be found. To see the definition
of L-numbers, enter DISPLAY HISTORY at an arrow prompt (=>).
=> s 15 and (direct? (2a) detect?)
    0 L5 AND (DIRECT? (2A) DETECT?)
L8
=> s 15 and (direct?)
          23 L5 AND (DIRECT?)
=> dup remove 19
PROCESSING COMPLETED FOR L9
       17 DUP REMOVE L9 (6 DUPLICATES REMOVED)
L10
=> d kwic 1-2
    ANSWER 1 OF 17 CAPLUS COPYRIGHT 2007 ACS on STN
L10
    . . to a labeled polynucleotide from a sample, and a signal generated
AB
    from a complex thereof is amplified through labeled antibodies
      ***directed*** to a receptor for the label. In particular embodiments,
    the assay provides information on gene expression.
    Chemiluminescent substances
IT
        ***Fluorescent***
                          dyes
       (for ***probe*** ***labeling***; amplification of signal using
       bead-based oligonucleotide assay)
    Chemical compounds
TT
        ***Enzymes*** , analysis
    RL: ARU (Analytical role, unclassified); ANST (Analytical study)
       (for ***probe*** ***labeling***; amplification of signal using
       bead-based oligonucleotide assay)
L10 ANSWER 2 OF 17 CAPLUS COPYRIGHT 2007 ACS on STN
      ***Fluorescent***
IT
                        dyes
                        ***labeled*** with; diagnostic for long term
       ( ***probe***
       response of HBV carrier to 3TC therapy by detg. the mutations in HBV
       polymerase region)
    Antibodies and Immunoglobulins
IT
        ***Enzymes*** , biological studies
    Haptens
    Proteins
    Radionuclides, biological studies
    RL: ARG (Analytical reagent use); BUU (Biological use, unclassified); ANST
    (Analytical study); BIOL (Biological study); USES (Uses)
       response of HBV carrier to 3TC therapy by detg. the mutations in HBV
       polymerase region)
IT
    Mutagenesis
       (site- ***directed*** , substitution, of DNA precore/core promoter,
       open reading frame region; diagnostic for long term response of HBV
       carrier to 3TC therapy by detg. the mutations in HBV polymerase region)
=> s 19 and detect?
L11
           14 L9 AND DETECT?
=> dup remove 111
PROCESSING COMPLETED FOR L11
L12
            8 DUP REMOVE L11 (6 DUPLICATES REMOVED)
=> d ti, bib, kwic 1-8 112
```

after the. . . .

```
ANSWER 1 OF 8 CAPLUS COPYRIGHT 2007 ACS on STN
L12
    Diagnostic for long term response of HBV carrier to 3TC therapy by
TI
    determining the mutations in HBV polymerase region
     2004:311076 CAPLUS <<LOGINID::20071119>>
AN
     140:332459
DN
    Diagnostic for long term response of HBV carrier to 3TC therapy by
TI
     determining the mutations in HBV polymerase region
    Korba, Brent E.; Ciancio, Alessia; Gerin, John L.
IN
    Georgetown University, USA
PA
     PCT Int. Appl., 107 pp.
SO
     CODEN: PIXXD2
DT
     Patent
     English
LA
FAN.CNT 1
                                                                 DATE
                                          APPLICATION NO.
                        KIND
                               DATE
     PATENT NO.
                        _ _ _ -
                                                                 20031001
                                          WO 2003-US31121
                         A2
                               20040415
ΡI
     WO 2004031729
                               20040715
                         A3
     WO 2004031729
           AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN,
            CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE,
            GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK,
            LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NI, NO, NZ,
            OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SY, TJ, TM,
            TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW
        RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY,
            KG, KZ, MD, RU, TJ, TM, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES,
            FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, RO, SE, SI, SK, TR,
            BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG
                                          AU 2003-277208
                                                                20031001
     AU 2003277208
                         A1
                               20040423
                                          US 2003-677920
                                                                 20031001
                         A1
     US 2005053916
                               20050310
PRAI US 2002-415301P P
                               20021001
                               20031001
     WO 2003-US31121 W
     Chemicals
IT
        (biochems., for ***detecting*** labeled HBV; diagnostic for long
        term response of HBV carrier to 3TC therapy by detg. the mutations in
       HBV polymerase region)
     Dot blot hybridization
IT
     Immunoassay
     Radiochemical analysis
     Spectroscopy
        (for ***detecting***
                                labeled HBV; diagnostic for long term response
        of HBV carrier to 3TC therapy by detg. the mutations in HBV polymerase
        region)
IT
     Catalysis
        (photochem., for ***detecting*** labeled HBV; diagnostic for long
        term response of HBV carrier to 3TC therapy by detg. the mutations in
       HBV polymerase region)
       ***Fluorescent*** dyes
IT
        response of HBV carrier to 3TC therapy by detg. the mutations in HBV
       polymerase region)
     Antibodies and Immunoglobulins
IT
         ***Enzymes*** , biological studies
     Haptens
     Proteins
     Radionuclides, biological studies
     RL: ARG (Analytical reagent use); BUU (Biological use, unclassified); ANST
     (Analytical study); BIOL (Biological study); USES (Uses)
                          ***labeled*** with; diagnostic for long term
        ( ***probe***
       response of HBV carrier to 3TC therapy by detg. the mutations in HBV
       polymerase region)
    Mutagenesis
IT
        (site- ***directed*** , substitution, of DNA precore/core promoter,
       open reading frame region; diagnostic for long term response of HBV
       carrier to 3TC therapy by detg. the mutations in HBV polymerase region)
    ANSWER 2 OF 8 CAPLUS COPYRIGHT 2007 ACS on STN
L12
    Hybridization assays using target enhanced signal amplification for
TI
       ***detection*** of Mycobacterium tuberculosis
     2003:930834 CAPLUS <<LOGINID::20071119>>
AN
    140:1537
DN
    Hybridization assays using target enhanced signal amplification for
TI
       ***detection*** of Mycobacterium tuberculosis
    Dattagupta, Nanibhushan
IN
    USA
PA
    U.S. Pat. Appl. Publ., 16 pp.
SO
    CODEN: USXXCO
```

```
Patent
\operatorname{DT}
    English
LA
FAN.CNT 1
     PATENT NO. KIND DATE
                                           APPLICATION NO. DATE
                       _ ----
    US 2003219755 A1 20031127 US 2002-155666 20020524
PΙ
PRAI US 2002-155666
                               20020524
    Hybridization assays using target enhanced signal amplification for
TI
       ***detection*** of Mycobacterium tuberculosis
     This invention relates to methods of signal amplification in nucleic acid
AB
     hybridization reactions without the use of ***direct***
                                                                amplification
     of the target sequence. More particularly, it relates to methods of
                        target nucleic acids in samples such that
       ***detecting***
       ***detection*** is accomplished via probe-target and target-target
     hybridization. In one aspect, the present invention relates to methods of
       ***detecting***
                        genomic target nucleic acids such that the signal is
     amplified via formation of target-probe complexes. The expt. demonstrated
     that the. . . mols. assocd. with each probe mol. can be enhanced, which
     in turn provides a platform for enhancing signal using a
       ***detectable*** probe that binds to the target nucleic acids in the
     complex. The probes used for nucleic acid hybridization are immobilized
     to solid support in biochip. The invention provides probe sequence for
       ***detection*** of gene IS6110 of Mycobacterium tuberculosis.
     hybridization target enhanced signal amplification; Mycobacterium
ST
       ***detection*** probe microarray
     Gene, microbial
IT
     RL: ANT (Analyte); DGN (Diagnostic use); ANST (Analytical study); BIOL
     (Biological study); USES (Uses)
                  ***detection*** of; hybridization assays using target
        enhanced signal amplification for ***detection*** of Mycobacterium
        tuberculosis)
IT
    Lung
        (aspirate, samples from; hybridization assays using target enhanced
        signal amplification for ***detection*** of Mycobacterium
        tuberculosis)
     Bacillus anthracis
IT
     Human immunodeficiency virus
           ***detection*** of; hybridization assays using target enhanced
        signal amplification for ***detection*** of Mycobacterium
        tuberculosis)
     Test kits
IT
        (diagnostic; hybridization assays using target enhanced signal
        amplification for ***detection*** of Mycobacterium tuberculosis)
     Urethra
IT
     Vagina
        (discharge, samples from; hybridization assays using target enhanced
        signal amplification for ***detection*** of Mycobacterium
        tuberculosis)
     Nucleic acids
IT
     RL: ANT (Analyte); DGN (Diagnostic use); ANST (Analytical study); BIOL
     (Biological study); USES (Uses)
        (from bacterial or viral infectious agent., ***detection***
       hybridization assays using target enhanced signal amplification for
                           of Mycobacterium tuberculosis)
          ***detection***
TT
     Blood analysis
    DNA microarray technology
    Microarray technology
    Mycobacterium tuberculosis
    Nucleic acid hybridization
     Urine analysis
        (hybridization assays using target enhanced signal amplification for
          ***detection***
                           of Mycobacterium tuberculosis)
IT
     Probes (nucleic acid)
    RL: ARG (Analytical reagent use); DGN (Diagnostic use); PRP (Properties);
    ANST (Analytical study); BIOL (Biological study); USES (Uses)
        (hybridization assays using target enhanced signal amplification for
                           of Mycobacterium tuberculosis)
          ***detection***
    Oligonucleotides
IT
    RL: ARG (Analytical reagent use); DGN (Diagnostic use); ANST (Analytical
     study); BIOL (Biological study); USES (Uses)
        (immobilized, on silicon, plastic, ceramic, rubber, or polymer surface;
       hybridization assays using target enhanced signal amplification for
                           of Mycobacterium tuberculosis)
          ***detection***
    Fluorescence resonance energy transfer
IT
        (label; hybridization assays using target enhanced signal amplification
                               of Mycobacterium tuberculosis)
             ***detection***
       for
       ***Oligonucleotides***
```

IT

```
RL: ARG (Analytical reagent use); DGN (Diagnostic use); ANST (Analytical
    study); BIOL (Biological study); USES (Uses)
        ( ***labeled*** , chem., ***enzymic*** ; hybridization assays
       using target enhanced signal amplification for ***detection*** of
       Mycobacterium tuberculosis)
    Diagnosis
IT
        (mol.; hybridization assays using target enhanced signal amplification
       for ***detection*** of Mycobacterium tuberculosis)
    Immobilization, molecular or cellular
IT
        (of probe to solid support; hybridization assays using target enhanced
       signal amplification for ***detection*** of Mycobacterium
       tuberculosis)
    Cytolysis
IT
        (of samples; hybridization assays using target enhanced signal
       amplification for ***detection*** of Mycobacterium tuberculosis)
IT
     Furocoumarins
    RL: ARG (Analytical reagent use); DGN (Diagnostic use); ANST (Analytical
     study); BIOL (Biological study); USES (Uses)
        (probe chem. labeled with; hybridization assays using target enhanced
       signal amplification for ***detection*** of Mycobacterium
       tuberculosis)
     Ceramics
IT
        (probe immobilized to; hybridization assays using target enhanced
       signal amplification for ***detection*** of Mycobacterium
       tuberculosis)
    Glass, uses
IT
    Plastics, uses
     Polymers, uses
    Rubber, uses
    RL: DEV (Device component use); USES (Uses)
        (probe immobilized to; hybridization assays using target enhanced
       signal amplification for ***detection*** of Mycobacterium
       tuberculosis)
    Chromophores
IT
        · ***Fluorescent***
                          substances
     Luminescent substances
        target enhanced signal amplification for ***detection*** of
       Mycobacterium tuberculosis)
IT
     Isotopes
    RL: ARG (Analytical reagent use); DGN (Diagnostic use); ANST (Analytical
    study); BIOL (Biological study); USES (Uses)
        (probe labeled with; hybridization assays using target enhanced signal
       amplification for ***detection*** of Mycobacterium tuberculosis)
    Body fluid
TT
        (pus, samples from; hybridization assays using target enhanced signal
       amplification for ***detection*** of Mycobacterium tuberculosis)
    Human
        (samples for ***detection*** isolated from; hybridization assays
       using target enhanced signal amplification for ***detection***
       Mycobacterium tuberculosis)
    Amniotic fluid
IT
    Cerebrospinal fluid
    Feces
     Saliva
     Semen
     Sputum
    Tear (ocular fluid)
        (samples from; hybridization assays using target enhanced signal
       amplification for ***detection*** of Mycobacterium tuberculosis)
    64358-50-5, 4'-Aminomethyl-trioxsalen 67620-23-9, Ethidium diazide
IT
    67823-52-3, 2-Azidofluorene 69063-03-2, 4-Azido-7-chloroguinoline
    80500-62-5, 4'-Aminomethyl-4,5'-dimethylangelicin 626233-98-5D, mono-
    and bis-aminoalkyl derivs. 626233-99-6D, mono- and bis-aminoalkyl
                           626234-01-3 626234-02-4 626234-03-5
    derivs.
              626234-00-2
    RL: ARG (Analytical reagent use); DGN (Diagnostic use); ANST (Analytical
    study); BIOL (Biological study); USES (Uses)
        (as intercalator compd. bound to probe; hybridization assays using
       target enhanced signal amplification for ***detection*** of
       Mycobacterium tuberculosis)
    260-94-6, Acridine
    RL: ARG (Analytical reagent use); DGN (Diagnostic use); ANST (Analytical
    study); BIOL (Biological study); USES (Uses)
       (dye, probe chem. labeled with; hybridization assays using target
       enhanced signal amplification for ***detection*** of Mycobacterium
       tuberculosis)
    58880-05-0, Ethidium monoazide
```

IT

IT

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RL: ARG (Analytical reagent use); DGN (Diagnostic use); ANST (Analytical
     study); BIOL (Biological study); USES (Uses)
        (ethidium monoazide, as intercalator compd. bound to probe;
        hybridization assays using target enhanced signal amplification for
          ***detection*** of Mycobacterium tuberculosis)
     139784-50-2, GenBank X17348 200668-87-7, GenBank Y15740
IT
     RL: BSU (Biological study, unclassified); PRP (Properties); BIOL
     (Biological study)
        (hybridization assays using target enhanced signal amplification for
          ***detection*** of Mycobacterium tuberculosis)
     627561-88-0
                   627561-89-1
                                 627561-90-4
IT
     RL: ARG (Analytical reagent use); DGN (Diagnostic use); PRP (Properties);
     ANST (Analytical study); BIOL (Biological study); USES (Uses)
        (oligonucleotide probe sequence; hybridization assays using target
        enhanced signal amplification for ***detection*** of Mycobacterium
        tuberculosis)
     91-22-5, Quinoline, biological studies 92-82-0, Phenazine 92-84-2,
IT
     Phenothiazine 229-87-8, Phenanthridine
     RL: ARG (Analytical reagent use); DGN (Diagnostic use); ANST (Analytical
     study); BIOL (Biological study); USES (Uses)
        (probe chem. labeled with; hybridization assays using target enhanced
        signal amplification for ***detection*** of Mycobacterium
        tuberculosis)
     7440-21-3, Silicon, uses
IT
     RL: DEV (Device component use); USES (Uses)
        (probe immobilized to; hybridization assays using target enhanced
        signal amplification for ***detection*** of Mycobacterium
        tuberculosis)
     627567-49-1
IT
     RL: PRP (Properties)
        (unclaimed nucleotide sequence; hybridization assays using target
        enhanced signal amplification for ***detection*** of Mycobacterium
        tuberculosis)
    ANSWER 3 OF 8 CAPLUS COPYRIGHT 2007 ACS on STN DUPLICATE 1
L12
     Bioinformatic identification, cloning, sequences and biocatalytic use of
TI
     microbial thermostable phosphatases and design of new thermostable
     phosphatases
     2003:34374 CAPLUS <<LOGINID::20071119>>
AN
       Correction of: 2002:850246
     138:51927
DN
       Correction of: 137:348420
     Bioinformatic identification, cloning, sequences and biocatalytic use of
TI
     microbial thermostable phosphatases and design of new thermostable
     phosphatases
     Short, Jay M.; Mathur, Eric J.; Lee, Edd; Bylina, Edward
IN
PA
     USA
    U.S. Pat. Appl. Publ., 47 pp., Cont.-in-part of U.S. Ser. No. 202,681.
SO
     CODEN: USXXCO
DT
     Patent
LA
     English
FAN.CNT 2
                         KIND
                                            APPLICATION NO.
     PATENT NO.
                                DATE
                                                                   DATE
    US 2002164751
                                20021107
PI
                          A1
                                            US 2001-902525
                                                                   20010709
     WO 9748416
                          A1
                                            WO 1997-US10784
                                19971224
                                                                   19970619
         W: AU, CA, JP, US
         RW: AT, BE, CH, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE
     EP 1488802
                                20041222
                                            EP 2004-20554
                                                                   19970619
                          A2
         R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT,
             IE, FI
     WO 2003006610
                          A2
                                20030123
                                            WO 2002-US21693
                                                                   20020709
            AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN,
             CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH,
             GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR,
             LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH,
             PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ,
             UA, UG, US, UZ, VN, YU, ZA, ZM, ZW
         RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY,
             KG, KZ, MD, RU, TJ, TM, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES,
             FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK, TR, BF, BJ, CF,
             CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG
                                20030129
    AU 2002324477
                          A1
                                            AU 2002-324477
                                                                   20020709
    US 2005186605
                          Α1
                                                                   20050131
                                20050825
                                            US 2005-47257
PRAI US 1996-33752P
                         P
                                19960619
    WO 1997-US10784
                                19970619
                         W
    US 1999-202681
                         A2
                                19991223
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20010709
                        A2
    US 2001-902525
                              20020709
                        W
    WO 2002-US21693
    Genetic polymorphism
IT
                       ***detection*** of; bioinformatic identification,
        (bioinformatic
       cloning, sequences and biocatalytic use of microbial thermostable
       phosphatases and design of new thermostable phosphatases)
     Probes (nucleic acid)
IT
    RL: ARG (Analytical reagent use); BUU (Biological use, unclassified); ANST
     (Analytical study); BIOL (Biological study); USES (Uses)
              ***detection*** of thermostable phosphatase gene;
       bioinformatic identification, cloning, sequences and biocatalytic use
       of microbial thermostable phosphatases and design of new thermostable
       phosphatases)
    Chemiluminescent substances
IT
        ***Fluorescent***
                           indicators
     Isotope indicators
        by:
       bioinformatic identification, cloning, sequences and biocatalytic use
       of microbial thermostable phosphatases and design of new thermostable
       phosphatases)
       ***Enzymes*** , uses
IT
    Haptens
    RL: ARG (Analytical reagent use); ANST (Analytical study); USES (Uses)
          bioinformatic identification, cloning, sequences and biocatalytic use
       of microbial thermostable phosphatases and design of new thermostable
       phosphatases)
IT
    Mutagenesis
        (site- ***directed*** , protein engineering using; bioinformatic
       identification, cloning, sequences and biocatalytic use of microbial
       thermostable phosphatases and design of new thermostable phosphatases)
                      MEDLINE on STN
                                                     DUPLICATE 2
L12
    ANSWER 4 OF 8
       ***Detection*** of minute virus of mice using real time quantitative
TI
    PCR in assessment of virus clearance during the purification of Mammalian
    cell substrate derived biotherapeutics.
                   MEDLINE <<LOGINID::20071119>>
     2002661591
AN
     PubMed ID: 12421584
DN
       ***Detection*** of minute virus of mice using real time quantitative
TI
    PCR in assessment of virus clearance during the purification of Mammalian .
     cell substrate derived biotherapeutics.
     Zhan Dejin; Roy Margaret R; Valera Christine; Cardenas Jesse; Vennari
ΑU
    Joann C; Chen Janice W; Liu Shengjiang
    Virology R&D Laboratory, Department of Cell Culture and Fermentation R&D,
CS
    Genentech Inc., 1 DNA Way, South San Francisco, CA 94080, USA.
    Biologicals : journal of the International Association of Biological
SO
     Standardization, (2002 Dec) Vol. 30, No. 4, pp. 259-70.
    Journal code: 9004494. ISSN: 1045-1056.
    England: United Kingdom
CY
DT
     (COMPARATIVE STUDY)
    Journal; Article; (JOURNAL ARTICLE)
    English
LA
    Priority Journals
FS
    200306
EM
ED
    Entered STN: 8 Nov 2002
    Last Updated on STN: 14 Jun 2003
    Entered Medline: 13 Jun 2003
      ***Detection*** of minute virus of mice using real time quantitative
TI
    PCR in assessment of virus clearance during the purification of Mammalian.
    A real time quantitative PCR assay has been developed for
AB
      ***detecting*** minute virus of mice (MVM). This assay ***directly***
    quantifies PCR product by monitoring the increase of fluorescence
    intensity emitted during ***enzymatic*** hydrolysis of an
      covalently with
      ***fluorescent*** reporting and quenching dyes via Taq polymerase
    5'-->3' exonuclease activity. The quantity of MVM DNA molecules in the
    samples was. . . have demonstrated that MVM TaqMan PCR assay is
    approximately 1000-fold more sensitive than the microplate infectivity
    assay with the lowest ***detection*** limit of approximately one
    particle per reaction. The reliable ***detection*** range is within
    100 to 10(9) molecules per reaction with high reproducibility. The intra
    assay variation is <2.5%, and the. . .
L12
    ANSWER 5 OF 8 CAPLUS COPYRIGHT 2007 ACS on STN
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TI

19970619

A3

EP 1997-933154

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studies
   1999:189229 CAPLUS <<LOGINID::20071119>>
AN
    130:219113
DN
     TI
     studies
   Horn, Thomas; Schroeder, Hartmut R.; Warner, Brian D.; Fiss, Ellen; Sells,
IN
    Todd; Law, Say-Jong
    Chiron Diagnostics Corporation, USA
PA
    PCT Int. Appl., 68 pp.
SO
    CODEN: PIXXD2
DT
    Patent
    English
LA
FAN.CNT 1
    PATENT NO. KIND
                         DATE APPLICATION NO. DATE
                   ____
                  A2 19990311 WO 1998-US18397 19980903
PI
    WO 9911813
    WO 9911813
                A3
                         19990506
       W: AU, CA, JP
       RW: AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL,
          PT, SE
                         19990322 AU 1998-92204 19980903
20000621 EP 1998-944737 19980903
    AU 9892204
                    A
    EP 1009852
                    A2
       R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT,
          IE, FI
    US 2001009760 A1
                                  US 1998-146157
                                                    19980903
                         20010726
US 6465175 B2 20021015
JP 2001514859 T 20010918
PRAI US 1997-57810P P 19970904
WO 1998-US18397 W 19980903
                                  JP 2000-508820 19980903
    MARPAT 130:219113
OS
     TI
     studies
    . . that occurs when a quenchable dye-labeled oligomer forms a hybrid
AB
    complex. In addn., a method is provided for enhancing the
     ***detectable*** signal emitted from an amplification multimer
    hybridized to an oligomer probe to which a quenchable dye has been
    conjugated through. . . hybrid complex formation. Novel
    oligonucleotide probes are also provided that comprise an oligomer to
    which a quenchable dye has been ***directly*** or indirectly linked.
IT
    RL: ARU (Analytical role, unclassified); BPR (Biological process); BSU
    (Biological study, unclassified); BUU (Biological use, unclassified); ANST
    (Analytical study); BIOL (Biological study); PROC (Process); USES (Uses)
      (branched; ***oligonucleotide*** ***probes*** bearing
                ***fluorescent***
      quenchable
                                 ***labels*** , and methods of use
      in hybridization studies)
IT
    Cytometry
            (flow;
        hybridization studies)
   Nucleic acid hybridization
IT
      (in situ, fluorescence; ***oligonucleotide*** ***probes***
      bearing quenchable ***fluorescent*** ***labels*** , and methods
      of use in hybridization studies)
   Fluorescence quenching
IT
    Fluorescent dyes
    Fluorescent substances
    Genetic mapping
    Human immunodeficiency virus
   Nucleic acid hybridization
    PCR (polymerase chain reaction)
      hybridization studies)
IT
   DNA
    Gene
    Nucleic acids
   RL: ANT (Analyte); BPR (Biological process); BSU (Biological study,
    unclassified); ANST (Analytical study); BIOL (Biological study); PROC
    (Process)
      hybridization studies)
   Mutation
IT
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```
(point; ***oligonucleotide*** ***probes*** bearing quenchable
        hybridization studies)
    Oligonucleotides
\mathbf{IT}
    RL: ARU (Analytical role, unclassified); BPR (Biological process); BSU
    (Biological study, unclassified); ANST (Analytical study); BIOL
    (Biological study); PROC (Process)
       (probe, quenchable dye; ***oligonucleotide*** ***probes***
      bearing quenchable ***fluorescent*** ***labels*** , and methods
      of use in hybridization studies)
    Probes (nucleic acid)
IT
    RL: ARU (Analytical role, unclassified); BPR (Biological process); BSU
    (Biological study, unclassified); ANST (Analytical study); BIOL
    (Biological study); PROC (Process)
       (quenchable dye; ***oligonucleotide*** ***probes*** bearing
                 quenchable
      in hybridization studies)
    165599-63-3, BODIPY-FL
IT
    RL: ARU (Analytical role, unclassified); BUU (Biological use,
    unclassified); ANST (Analytical study); BIOL (Biological study); USES
    (Uses)
       (BODIPY FL; .***oligonucleotide*** ***probes*** bearing
      quenchable ***fluorescent*** ***labels*** , and methods of use
      in hybridization studies)
    9012-90-2, DNA polymerase
IT
    RL: BAC (Biological activity or effector, except adverse); BPR (Biological
    process); BSU (Biological study, unclassified); BUU (Biological use,
    unclassified); BIOL (Biological study); PROC (Process); USES (Uses)
             hybridization studies)
    9075-08-5, Restriction ***enzyme***
IT
    RL: ARU (Analytical role, unclassified); BAC (Biological activity or
    effector, except adverse); BPR (Biological process); BSU (Biological
    study, unclassified); ANST (Analytical study); BIOL (Biological study);
    PROC (Process)
       hybridization studies)
    221072-57-7 221074-26-6 221111-61-1
IT
    RL: ARU (Analytical role, unclassified); BPR (Biological process); BSU
    (Biological study, unclassified); ANST (Analytical study); BIOL
    (Biological study); PROC (Process)
       hybridization studies)
    138026-71-8D, Dipyrrometheneboron difluoride, derivs. 221052-46-6
IT
    RL: ARU (Analytical role, unclassified); BUU (Biological use,
    unclassified); ANST (Analytical study); BIOL (Biological study); USES
    (Uses)
      bearing quenchable
        hybridization studies)
   ANSWER 6 OF 8 CAPLUS COPYRIGHT 2007 ACS on STN DUPLICATE 3
L12
      ***Detection*** of microbial cells in aerosols using nucleic acid
TI
    probes
    1995:724407 CAPLUS <<LOGINID::20071119>>
AN
DN
    123:189433
      ***Detection*** of microbial cells in aerosols using nucleic acid
TI
    probes
    Neef, Alexander; Amann, Rudolf; Schleifer, Karl-Heinz
AU
CS
    Technische Universitaet Muenchen, Munich, D-80290, Germany
    Systematic and Applied Microbiology (1995), 18(1), 113-22
SO
    CODEN: SAMIDF; ISSN: 0723-2020
DT
    Journal
    English
LA
      ***Detection*** of microbial cells in aerosols using nucleic acid
TI
    probes
    . . methods were evaluated for the identification of microorganisms
AB
    in mixed bioaerosols. A cultivation-dependent method, colony
    hybridization, was compared to a ***direct*** , cultivation-independent
    approach, whole cell hybridization with ***fluorescently***
                   ***oligonucleotides*** . After sampling of the
      ***labeled***
    aerosols by filtration, special processing of filters (cells) preceded
    hybridization with ***fluorescently*** , digoxigenin- or ***enzyme***
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genus, or species affiliation of collected cells was analyzed with
rRNA-targeted probes. Using nucleic acid probes ***directed***
against the multiple cloning site, plasmid bearing Escherichia coli
colonies could be differentiated from wild-type colonies. The microbial
compn. of. . . monitoring of aerosols generated by std. microbiol. lab.
procedures, low concns. of airborne Escherichia coli cells (1-450 m-3)
could be ***detected*** . Compared to conventional air monitoring
techniques, hybridization with nucleic acid probes should allow more rapid
and reliable ***detection*** of airborne microorganisms including
genetic engineered microorganisms.
microorganism ***detection*** aerosol hybridization
Microorganism
      ***detection*** of microbial cells in aerosols using nucleic acid
   probes)
Nucleic acid hybridization
   (DNA-DNA, ***detection*** of microbial cells in aerosols using
   nucleic acid probes)
Aerosols
   (airborne, biol., ***detection*** of microbial cells in aerosols
   using nucleic acid probes)
Nucleotides, biological studies
RL: ARG (Analytical reagent use); BSU (Biological study, unclassified);
ANST (Analytical study); BIOL (Biological study); USES (Uses)
   (oligo-, ***detection*** of microbial cells in aerosols using
   nucleic acid probes)
ANSWER 7 OF 8 CAPLUS COPYRIGHT 2007 ACS on STN
Rapid identification and in situ ***detection***
                                                  of microorganisms
using fluorescent rRNA-targeted oligonucleotides
122:24645
                                                  of microorganisms
Rapid identification and in situ ***detection***
using fluorescent rRNA-targeted oligonucleotides
Amann, R.; Zarda, B.; Trebesius, K. H.; Ludwig, W.; Schleifer, K. H.
Technische Universitaet Muenchen, Munich, 80290, Germany
Rapid Methods Autom. Microbiol. Immunol., [Int. Congr.], 7th (1994),
Meeting Date 1993, 237-44. Editor(s): Spencer, R. C.; Wright, E. P.;
Newsam, S. W. B. Publisher: Intercept, Andover, UK.
CODEN: 60TMA5
Conference; General Review
English
Rapid identification and in situ ***detection*** of microorganisms
using fluorescent rRNA-targeted oligonucleotides
A review with 23 refs. Often culture-dependent identification methods are
time consuming and fail to ***detect*** the majority of microorganisms
present in a sample due to the selectivity of media. Large 16 S and 23 S
rRNA data bases allow the ***directed*** design of species- and
group-specific oligonucleotide probes. Fixed whole microbial cells can be
identified ***directly*** in mixed samples by in situ hybridization
combination of PCR-assisted sequence retrieval and fluorescent
oligonucleotide probing has been used successfully to analyze rRNA
sequences of hitherto. . . originate from low cellular ribosome
contents of target organisms and from background fluorescence of the
samples. Hybridization with digoxigenin- or ***enzyme***
                   ***labeled***
                                                         or with
multiple ***labeled*** polynucleotide probes may circumvent these
problems in the future.
review microorganism ***detection*** identification hybridization;
fluorescent rRNA oligonucleotide microorganism ***detection***
Microorganism
Nucleic acid hybridization
   (rapid identification and in situ ***detection***
                                                     of microorganisms
   using fluorescent rRNA-targeted oligonucleotides)
Ribonucleic acids, ribosomal
RL: ARU (Analytical role, unclassified); ANST (Analytical study)
   (rapid identification and in situ ***detection***
                                                     of microorganisms
   using fluorescent rRNA-targeted oligonucleotides)
Nucleotides, uses
RL: ARG (Analytical reagent use); ANST (Analytical study); USES (Uses)
   (oligo-, rapid identification and in situ ***detection*** of
   microorganisms using fluorescent rRNA-targeted oligonucleotides)
ANSWER 8 OF 8 CAPLUS COPYRIGHT 2007 ACS on STN
         ***detection*** of viral nucleic acids using fluorescent
In situ
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ST IT

IT

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L12

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DN

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SO

DT

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AB

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IT

IT

IT

L12

probes

TI

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In situ ***detection*** of viral nucleic acids using fluorescent
TI
    probes
    Donovan, Richard M.
AU
    Div. Infect. Immunol. Dis., Univ. California, Davis, CA, 95616, USA
CS
    Proceedings of SPIE-The International Society for Optical Engineering
SO
     (1990), 1206 (New Technol. Cytom. Mol. Biol.), 2-6
    CODEN: PSISDG; ISSN: 0277-786X
     Journal
DT
    English
LA
             ***detection*** of viral nucleic acids using fluorescent
    In situ
TI
    probes
     . . . objective of this work was to develop and improve technols. in
AB
     cytometry and mol. biol. for the specific in situ ***detection***
    viral nucleic acids. The major application for this system was the
       ***detection*** and measurement of individual cells stained specifically
     for the human immunodeficiency virus (HIV) in patients with AIDS.
     Staining procedures used nucleic acid either ***directly***
     indirectly ***labeled*** with
                                        ***enzymes*** or
                                                             ***fluorescent***
       ***probes*** . A cytometry system was used to acquire digitized images
     of labeled cells and det. their individual staining d. or intensity.. .
     Nucleic acids
IT
     RL: ANT (Analyte); ANST (Analytical study)
        ( ***detection*** of, of human immunodeficiency virus, by cytometry,
        AIDS in relation to)
     Immunodeficiency
\mathbf{IT}
        (acquired immune deficiency syndrome, ***detection*** of nucleic
        acids of HIV virus by cytometry in relation to)
    Virus, animal
{f TT}
        (human immunodeficiency, nucleic acid of, ***detection*** of, by
        cytometry, fluorescence probes in)
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COST IN U.S. DOLLARS
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                                                              87.78
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DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS) SINCE FILE
                                                               TOTAL
                                                     ENTRY
                                                              SESSION
CA SUBSCRIBER PRICE
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                                                                -7.02
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